



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/955,434	09/10/2001	Peter Sauerbrei	49658-0512	1649

29989 7590 12/04/2003

HICKMAN PALERMO TRUONG & BECKER, LLP
1600 WILLOW STREET
SAN JOSE, CA 95125

EXAMINER

CHUNG, DANIEL J

ART UNIT	PAPER NUMBER
----------	--------------

2672

DATE MAILED: 12/04/2003

4

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/955,434

Applicant(s)

SAUERBREI, PETER

Examiner

Daniel J Chung

Art Unit

2672

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-58 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-58 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Information Disclosure Statement

Receipt is acknowledged of Applicant's Information Disclosure Statement of 9-10-2001, which has been placed in the application file and considered by the Examiner.

Drawings

The drawings are not objected to by the Examiner.

Specification

Please review the application and correct all informalities.

The abstract of the disclosure is objected to because the abstract should be less than 150 words or 200 words with one paragraph form. Correction is required. See MPEP § 608.01(b).

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-2,8-9,32-33,39-40 and 55-58 are rejected under 35 U.S.C. 102(e) as being anticipated by Asente. (6,310,622)

Regarding claim 1, Asente discloses that the claimed feature of a method for determining the spacing of objects, (See Abstract, Fig 1-4, col 1 line 39-col 3 line 5) the method comprising the steps of: receiving [102] data that defines a constraint [i.e. "path"; 301,401] (See col 3 line 44-45); receiving [106] a set of spacing parameter values ["spacing parameter"; 208,209] that indicate how to space objects across constraint (See Fig 2 col 3 line 53-55, col 4 line 21-23); and generating [112] a set of points for spacing objects across constraint based on a bound of at least one dimension of constraint and set of spacing parameter values. (See Fig 3, Fig 4, col 3 line 59-62)

Regarding claim 2, Asente discloses that selecting a grid type [i.e. "selected graphical element"; 201] from a plurality of grid types, wherein the grid type is associated with one or more grid attributes (See col 3 line 33-34, col 5 line 26-28); and mapping a grid of selected grid type onto constraint. (See Fig 3, Fig 4)

Regarding claim 8, Asente discloses that the step of receiving input that specifies one or more attributes of constraint, wherein one or more attributes are associated with one or more bounds of one or more dimensions of constraint. (See Fig 1, Fig 2)

Regarding claim 9, Asente discloses that defines a constraint includes the step of receiving data that defines a one dimensional constraint. (See Fig 3, Fig 4)

Regarding claims 32-33 and 39-40, claims 32-33 and 39-40 are similar in scope to the claims 1-2 and 8-9, and thus the rejections to claims 1-2 and 8-9 hereinabove are also applicable to claims 32-33 and 39-40.

Regarding claims 55-58, claims 55-58 are similar in scope to the claims 1-2, and thus the rejections to claims 1-2 hereinabove are also applicable to claims 55-58.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 3-7, 10-31, 34-38 and 41-54 are rejected under 35 U.S.C. 103(a) as being unpatentable over Asente in view of Schuster et al (5,831,632).

Regarding claims 3-7, Asente does not specifically disclose that "selecting the grid type based on the set of received spacing parameter values, the defined constraint,

the user input that specifies a particular type of grid that is to be used, the set of spacing parameter values and the defined constraint and generating a set of grid points based on attributes of selected grid type; and translating set of grid points onto constraint.”

However, such limitations [i.e. “the graphical pattern placement technique”] are shown in the teaching of Schuster et al. [‘adjusting the pattern cell (grid type) based on user’s preference, path (constraint) or spacing parameters’] (See Fig 3, Fig 4, col 2 line 3-48, col 5 line 23-col 6 line 14, col 6 line 57-col 7 line 30) It would have been obvious to one skilled in the art to incorporate the teaching of Schuster et al into the teaching of Asente, in order to “place graphical patterns along borders or other shapes such that graphically pleasing borders or shapes can be produced with only a minimal amount of user time” (See col 1 line 39-46 in Schuster et al), as such improvement is also advantageously desirable in the teaching of Asente for producing graphically pleasing graphical pattern along a border or other shape with less time. (See col 1 line 5-35 in Asente)

Regarding claims 10-15, Asente discloses that defines a constraint includes the step of receiving data that defines a multi-dimensional, a spline, a sphere, a cylinder, a rectangle or a line segment constraint. (See Fig 1-4, Also See Fig 3-4, Fig 7-13 in Schuster et al)

Regarding claim 16-24, Asente discloses that the step of selecting a grid type includes the step of selecting a two dimensional/three-dimensional/ rectangular/ polar/

hex/ triangular mesh/ spherical/ random/ scattered grid type. (See Fig 1-4, Also See Fig 3-4, Fig 7-13 in Schuster et al)

Regarding claim 25, refer to the discussion for the claim 3 hereinabove, Schuster et al discloses that the step of receiving a set of object information, wherein the set of object information identifies a particular object to be placed on the constraint at locations based on generated set of points. [i.e. patterns at corner] (See Fig 6, Fig 13)

Regarding claim 26, refer to the discussion for the claim 3 hereinabove, Schuster et al discloses that the step of generating the set of grid points includes the steps of generating the set of grid points based on the set of object information. (See Fig 6, Fig 13)

Regarding claim 27, refer to the discussion for the claim 3 hereinabove, Schuster et al discloses that the set of object information identifies a bounding box that is associated with the particular object; and the step of generating the set of grid points based on the set of object information comprises the step of generating the set of grid points based the bounding box. (See Fig 10A, Fig 13A)

Regarding claim 28, Asente discloses that the step of mapping a grid of selected grid type onto constraint includes the step of determining one or more locations to place

objects on constraint by identifying one or more areas of grid that intersect constraint.
(See Fig 1-4; also See Fig 3-4, Fig 9-13 in Schuster)

Regarding claim 29, Asente discloses that receiving pivot point information, wherein the pivot point information specifies pivot points for the placement of objects relative to the generated set of points; and placing objects on constraint such that the pivot points of objects coincide with one ore more locations. (See Fig 1-4; also See Fig 3-4, Fig 9-13 in Schuster)

Regarding claim 30, refer to the discussion for the claim 3 hereinabove, Schuster et al discloses that identifying a particular object; generating a copy of particular object; and placing the copy of particular object at one or more of one or more locations. (See Fig 6, Fig 13)

Regarding claim 31, refer to the discussion for the claim 3 hereinabove, Schuster et al discloses that identifying a particular object; generating an instance of particular object; and placing the instance of particular object at one or more of one or more locations. [i.e. patterns at corner] (See Fig 6, Fig 13)

Regarding claims 34-38 and 48-54, claims 34-38 and 48-54are similar in scope to the claims 3-7 and 25-31, and thus the rejections to claims 3-7 and 25-31 hereinabove are also applicable to claims 34-38 and 48-54.

Regarding claims 41-47, claims 41-47 are similar in scope to the claims 10-24, and thus the rejections to claims 10-24 hereinabove are also applicable to claims 41-47.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Daniel J. Chung whose telephone number is (703) 306-3419. He can normally be reached Monday-Thursday and alternate Fridays from 7:30am- 5:00pm. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael, Razavi, can be reached at (703) 305-4713.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks
Washington, D.C. 20231

or faxed to:

(703) 872-9314 (for Technology Center 2600 only)


Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA, Sixth Floor (Receptionist).

Application/Control Number: 09/955,434
Art Unit: 2672

Page 9

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is (703) 306-0377.

djc
November 24, 2003



MICHAEL RAZAVI
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600